



TMH:jlc 04/11/03 4810-56910 182068.doc

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

PATENT #13

RECEIVED

APR 15 2003

TECH CENTER 1600/2900

In re application of: Wang *et al.*

Application No. 09/733,507

Filed: December 8, 2000

For: CYCLIN-DEPENDENT KINASE
INHIBITORS AS PLANT GROWTH
REGULATORS

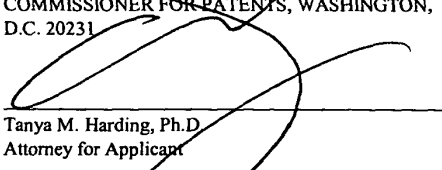
Examiner: Cynthia E. Collins

Date: April 11, 2003

Art Unit: 1638

CERTIFICATE OF MAILING

I hereby certify that this paper and the documents referred to as being attached or enclosed herewith are being deposited with the United States Postal Service on April 11, 2003 as First Class Mail in an envelope addressed to: COMMISSIONER FOR PATENTS, WASHINGTON, D.C. 20231


Tanya M. Harding, Ph.D.
Attorney for Applicant

SUPPLEMENTAL INFORMATION DISCLOSURE STATEMENT
PURSUANT TO 37 C.F.R. § 1.97(b)(3)

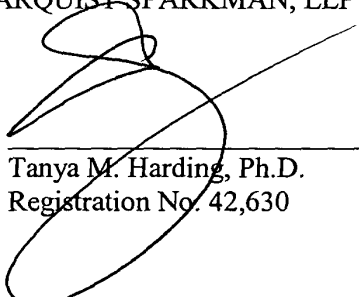
COMMISSIONER FOR PATENTS
WASHINGTON, DC 20231

Listed on the accompanying form PTO-1449 and enclosed herewith are several English-language documents. Applicants respectfully request that these documents be listed as references cited on the issued patent.

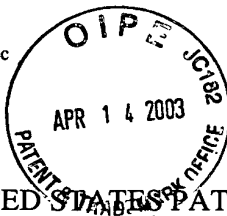
Applicants filed this Information Disclosure Statement ("IDS") before the mailing date of a first Office action on the merits. As a result, no fee should be required to file this IDS. However, if the Patent Office determines that a fee is required for Applicants to file this Information Disclosure Statement, please see the attached transmittal letter for deposit account authority.

Respectfully submitted,

KLARQUIST SPARKMAN, LLP

By 
Tanya M. Harding, Ph.D.
Registration No. 42,630

One World Trade Center, Suite 1600
121 S.W. Salmon Street
Portland, Oregon 97204
Telephone: (503) 226-7391
Facsimile: (503) 228-9446



GAU 1638
#B
JTB

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re application of: Wang *et al.*

Art Unit: 1638

Application No. 09/733,507

CERTIFICATE OF MAILING

Filed: December 8, 2000

For: CYCLIN-DEPENDENT KINASE
INHIBITORS AS PLANT GROWTH
REGULATORS

I hereby certify that this paper and the documents referred to as being attached or enclosed herewith are being deposited with the United States Postal Service on April 11, 2003, as First Class Mail in an envelope addressed to: COMMISSIONER FOR PATENTS, WASHINGTON D.C. 20231.

Examiner: Cynthia E. Collins

Date: April 11, 2003

Tanya M. Harding, Ph.D.
Attorney for Applicant

RECEIVED

APR 15 2003

TECH CENTER 1600/2900

TRANSMITTAL LETTER

COMMISSIONER FOR PATENTS
WASHINGTON, DC 20231

Enclosed for filing in the application referenced above are the following:

- ☒ Supplemental Information Disclosure Statement
 - ☒ Form 1449 and copies of (42) references cited thereon
- ☒ The Director is hereby authorized to charge any fees that may be required to Deposit Account No. 02-4550. A copy of this sheet is enclosed.
- ☒ Please return the enclosed postcard to confirm that the items listed above have been received.

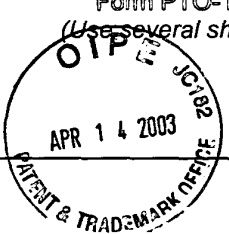
Respectfully submitted,

KLARQUIST SPARKMAN, LLP

By

Tanya M. Harding, Ph.D.
Registration No. 42,630

One World Trade Center, Suite 1600
121 S.W. Salmon Street
Portland, Oregon 97204
Telephone: (503) 226-7391
Facsimile: (503) 228-9446
cc: Docketing

INFORMATION DISCLOSURE CITATION Form PTO-1449 (Modified) (Use several sheets if necessary)				ATTY. DOCKET NO. 81601-16		SERIAL NO. 09/733,507	
				APPLICANT WANG, Hong <i>et al.</i>			
				FILING DATE December 8, 2000		GROUP	

RECEIVED
 APR 15 2003
 TECH CENTER 1600/2900


U.S. PATENT DOCUMENTS							
Examiner Initial	Document Number	Date	Name	Class	Subclass	Filing Date If Appropriate	

FOREIGN PATENT DOCUMENTS							
Document Number	Date	Country	Class	Subclass	Translation		

OTHER ART (Including Author, Title, Date, Pertinent Pages, Etc.)	
C1	Alberts B, Bray D, Lewis J, Raff M, Roberts K, Watson JD (1983) Molecular Biology of the Cell. Garland Publishing: New York, pp. 1139-1142
C2	Bell MH, Halford NG, Ormrod JC, Francis D (1993) Tobacco plants transformed with cdc25, a mitotic inducer gene from fission yeast. Plant Mol Biol 23: 445-451
C3	Brock TG, Kaufman PB (1991) Growth regulators: an account of hormones and growth regulation. In Growth and Development, Plant Physiology - A Treatise. Volume 10. Academic Press: San Diego, pp. 277-340
C4	Colasanti J, Cho S-O, Wick S, Sundaresan V (1993) Localization of the functional p34 ^{cdc2} homolog of maize in root tip and stomatal complex cells: association with predicted vision sites. Plant Cell 5: 1101-1111
C5	De Veylder L, Segers G, Glab N, Casteels P, Van Montagu M, Inzé D (1997) The Arabidopsis Cks1At protein binds the cyclin-dependent kinases Cdc2aAt and Cdc2bAt. FEBS Lett 412: 446-452
C6	Doonan J, Fobert P (1997) Conserved and novel regulators of the plant cell cycle. Curr Opin Cell Biol 9: 824-830
C7	Evans, M.L. (1984) Functions of hormones at the cellular level of organization. In Hormonal Regulation of Development II. Encyclopedia of Plant Physiology, New Series, Volume 10 (Scott T. K. ed.). Berlin: Springer-Verlag, pp. 23-79
C8	Ferreira PCG, Hemerly AS, de Almeida Engler J, Van Montagu M, Engler G, Inzé D (1994) Developmental expression of the Arabidopsis cyclin gene cyc1At. Plant Cell 6: 1763-1774
C9	Ferreira PCG, Hemerly AS, Villarroel R, Van Montagu M, Inzé D (1991) The Arabidopsis functional homolog of the p34 ^{cdc2} protein kinase. Plant Cell 3: 531-540
C10	Francis D, Halford NG (1995) The plant cell cycle. Physiol Plant 93: 365-374
C11	Gorst JR, John PCL, Sek FJ (1991) Levels of p34 ^{cdc2} -like protein in dividing, differentiating and dedifferentiating cells of carrot. Planta 185: 304-310
C12	Grafi G, Larkins BA (1995) Endoreduplication in maize endosperm: involvement of M phase-promoting factor inhibition and induction of S phase-related kinases. Science 269: 1262-1264

S:\...form PTO-1449.doc


EXAMINER	DATE CONSIDERED
EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.	

INFORMATION DISCLOSURE CITATION Form PTO-1449 (Modified) Use several sheets if necessary				ATTY. DOCKET NO. 81601-16		SERIAL NO. 09/733,507	
				APPLICANT WANG, Hong <i>et al.</i>			
				FILING DATE December 8, 2000		GROUP 	
U.S. PATENT DOCUMENTS							
APR 15 2003 TECH CENTER 1600/2900							
Examiner Initial		Document Number	Date	Name	Class	Subclass	Filing Date If Appropriate
FOREIGN PATENT DOCUMENTS							
		Document Number	Date	Country	Class	Subclass	Translation
OTHER ART (Including Author, Title, Date, Pertinent Pages, Etc.)							
C13	Hagege D (1993) Proto-oncogenes in plants: widespread conserved genes for which roles? Plant Physiol Biochem 31: 621-629						
C14	Harper JW, Elledge SJ (1996) Cdk inhibitors in development and cancer. Curr Opin Genet Dev 6: 56-64						
C15	Hemerly, A.S. et al. (1999) Cell Cycle Control and Plant Morphogenesis: is There an Essential Link, Bio Essays, Vol 21, pp 29-37						
C16	Hemerly AS, Ferreira PCG, de Almeida Engler J, Van Montagu M, Engler G, Inzé D (1993) cdc2a expression in <i>Arabidopsis thaliana</i> is linked with competence for cell division. Plant Cell 5: 1711-1723						
C17	Hemerly A, de Almeida Engler J, Bergounioux C, Van Montagu M, Engler G, Inzé D, Ferreira P (1995) Dominant negative mutants of the Cdc2 kinase uncouple cell division from iterative plant development. EMBO J 14: 3925-3936						
C18	Hindley J, Phear GA (1984) Sequence of the cell division gene CDC2 from <i>Schizosaccharomyces pombe</i> : patterns of splicing and homology to protein kinases. Gene 31: 129-134						
C19	Hirayama T, Imajuku Y, Anai T, Matsui M, Oka A (1991) Identification of two cell-cycle-controlling cdc2 gene homologs in <i>Arabidopsis thaliana</i> . Gene 105: 159-165						
C20	Hirt H (1996) In and out of the plant cell cycle. Plant Molec Biol 31: 459-464						
C21	Jacobs T (1997) Why do plant cells divide? Plant Cell 9: 1021-1029						
C22	Jacobs TW (1995) Cell cycle control. Annu Rev Plant Physiol Plant Mol Biol 46: 317-339						
C23	Kaplan DR, Hagemann W (1991) The relationship of cell and organism in vascular plants. BioScience 41: 693-703						
C24	John PCL, Zhang K, Dong C, Diederich L, Wightman F (1993) p34 ^{cdc2} related proteins in control of cell cycle progression, the switch between division and differentiation in tissue development, and stimulation of division by auxin and cytokinin. Aust J Plant Physiol 20: 503-526						
C25	Lees E (1995) Cyclin-dependent kinase regulation. Curr Opin Cell Biol 7: 773-780						

EXAMINER	DATE CONSIDERED
EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.	

INFORMATION DISCLOSURE CITATION Form PTO-1449 (Modified) (Use several sheets if necessary)				ATTY. DOCKET NO. 81601-16		SERIAL NO. 09/733,507	
				APPLICANT WANG, Hong <i>et al.</i>			
				FILING DATE December 8, 2000		GROUP APR 15 2003	
U.S. PATENT DOCUMENTS							
TECH CENTER 1600/2900							
Examiner Initial	Document Number	Date	Name	Class	Subclass	Filing Date If Appropriate	
FOREIGN PATENT DOCUMENTS							
Document Number	Date	Country	Class	Subclass	Translation		
OTHER ART (Including Author, Title, Date, Pertinent Pages, Etc.)							
C26	Lindsey, K. and Topping, J. (1998) On the Relationship Between the Plant Cell and the Plant. Vol. 9, pp 171-177						
C27	Lorincz AT, Reed SI (1984) Primary structure homology between the product of yeast cell division control gene CDC28 and vertebrate oncogenes. Nature 307: 183-185						
C28	Luscher B, Eisenman RN (1990) New light on Myc and Myb. Part II. Myb. Genes Dev 4: 2235-2241						
C29	Martin C, Paz-Ares J (1997) MYB transcription factors in plants. Trends Genet 13: 67-73						
C30	Martinez MC, Jorgensen JE, Lawton MA, Lamb CJ, Doerner PW (1992) Spatial pattern of cdc2 expression in relation to meristem activity and cell proliferation during plant development. Proc Natl Acad Sci USA 89: 7360-7364						
C31	Meyerowitz EM (1997) Genetic control of cell division patterns in developing plants. Cell 88: 299-308						
C32	Miao G-H, Hong Z, Verma DPS (1993) Two functional soybean genes encoding p34 ^{cdc2} protein kinases are regulated by different plant developmental pathways Proc Natl Acad Sci USA 90: 943-947						
C33	Mineyuki Y, Yamashita M, Nagahama Y (1991) p34 ^{cdc2} kinase homologue in the preprophase band. Protoplasma 162: 182-186						
C34	Mizoguchi T, Gotoh Y, Nishida E, Yamaguchi-Shinozaki K, Hayashida N, Iwasaki T, Kamada H, Shinozaki K (1994) Characterization of two cDNAs that encode MAP kinase homologues in Arabidopsis thaliana and analysis of the possible role of auxin in activating such kinase activities in cultured cells. Plant J 5: 111-122						
C35	Parker JE, Coleman MJ, Szabo V, Frost LN, Schmidt R, van der Biezen EA, Moores T, Dean C, Daniels MJ, Jones JD (1997) The Arabidopsis downy mildew resistance gene RPP5 shares similarity to the toll and interleukin-1 receptors with N and L6. Plant Cell 9: 879-894						
C36	Pines J (1995) Cyclins and cyclin-dependent kinases: a biochemical view. Biochem J 308: 697-711						

EXAMINER	DATE CONSIDERED
EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.	

INFORMATION DISCLOSURE CITATION Form PTO-1449 (Modified) (Use several sheets if necessary)				ATTY. DOCKET NO. 81601-16		SERIAL NO. 09/733,507			
				APPLICANT WANG, Hong <i>et al.</i>				RECEIVED	
				FILING DATE December 8, 2000		GROUP APR 15 2003			
 U.S. PATENT DOCUMENTS TECH CENTER 1600/2900									
Examiner Initial	Document Number	Date	Name	Class	Subclass	Filing Date If Appropriate			
FOREIGN PATENT DOCUMENTS									
	Document Number	Date	Country	Class	Subclass	Translation			
OTHER ART (Including Author, Title, Date, Pertinent Pages, Etc.)									
C37	/	Renaudin J-P, Doonan JH, Freeman D, Hashimoto J, Hirt H, Inz D, Jacobs T, Kouchi H, Rouz P, Sauter M, Saviour A, Sorrell DA, Sundaresan V, Murray JAH (1996) Plant Cyclins: a unified nomenclature for plant A-, B- and D-type cyclins based on sequence organization. Plant Mol Biol 32: 1003-1018							
C38	/	Sauter M, Mekhedov SL, Kende H (1995) Gibberellin promotes histone H1 kinase activity and the expression of cdc2 and cyclin genes during the induction of rapid growth in deepwater rice internodes. Plant J 7: 623-632							
C39	/	Segers G, Gadisseur I, Bergounioux C, de Almeida Engler J, Jacquard A, Van Montagu M, Inzé D (1996) The Arabidopsis cyclin-dependent kinase gene cdc2bAt is preferentially expressed during S and G ₂ phases of the cell cycle. Plant J 10: 601-612							
C40	/	Sherr CJ, Roberts JM (1995) Inhibitors of mammalian G1 cyclin-dependent kinases. Genes Dev 9: 1149-1163							
C41	/	Soni R, Carmichael JP, Shah ZH, Murray JAH (1995) A family of cyclin D homologs from plants differentially controlled by growth regulators and containing the conserved retinoblastoma protein interaction motif. Plant Cell 7: 85-103							
C42	/	Wang H, Datla R, Georges F, Loewen M, Cutler AJ (1995) Promoters from kin1 and cor6.6, two homologous Arabidopsis thaliana genes: transcriptional regulation and gene expression induced by low temperature, ABA, osmoticum and dehydration. Plant Mol Biol 28: 605-617							

EXAMINER	DATE CONSIDERED
EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609; Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.	